

**INTERNATIONAL SEARCH REPORT**

International application No.

PCT/US02/05781

**A. CLASSIFICATION OF SUBJECT MATTER**

IPC(7) : H01L 31/042, 23/58; H05B 33/00  
 US CL : 136/261, 249, 244, 252, 255, 262; 428/917; 362/800; 257/636, 644, 646, 650, 79

According to International Patent Classification (IPC) or to both national classification and IPC

**B. FIELDS SEARCHED**

Minimum documentation searched (classification system followed by classification symbols)  
 U.S. : 136/261, 249, 244, 252, 255, 262; 428/917; 362/800; 257/636, 644, 646, 650, 79

Documentation searched other than minimum documentation to the extent that such documents are included in the fields searched

Electronic data base consulted during the international search (name of data base and, where practicable, search terms used)

**C. DOCUMENTS CONSIDERED TO BE RELEVANT**

| Category * | Citation of document, with indication, where appropriate, of the relevant passages           | Relevant to claim No. |
|------------|--|-----------------------|
| X          | US 5,912,068 A (JIA) 15 June 1999 (15.06.1999), column 3, line 24 through column 4, line 2.  | 1-75                  |
| —          |  | —                     |
| Y          |  | 76, 77                |
| X,E        | US 2002/0030246 A1 (EISENBEISER et al) 14 March 2002 (14.03.2002), abstract and pages 14-15. | 76, 77                |
| —          |  | —                     |
| Y,E        |  | 1-75                  |
| Y          | US 2002/0000584 A1 (EISENBEISER et al) 03 January 2002 (03.01.2002), abstract and page 3.    | 1-77                  |

Further documents are listed in the continuation of Box C.

See patent family annex.

|     |   |     |  |
|-----|---|-----|--|
| •   | Special categories of cited documents:  | "T" | later document published after the international filing date or priority date and not in conflict with the application but cited to understand the principle or theory underlying the invention  |
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| "E" | earlier application or patent published on or after the international filing date   | "Y" | document of particular relevance; the claimed invention cannot be considered to involve an inventive step when the document is combined with one or more other such documents, such combination being obvious to a person skilled in the art |
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| "O" | document referring to an oral disclosure, use, exhibition or other means  |     |  |
| "P" | document published prior to the international filing date but later than the priority date claimed  |     |  |

Date of the actual completion of the international search

14 June 2002 (14.06.2002)

Date of mailing of the international search report

19 JUL 2002

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